EUROPEAN PATENT OFFICE

Patent Abstracts of Japan

PUBLICATION NUMBER

2000090469

PUBLICATION DATE

31-03-00

(a)

APPLICATION DATE

07-09-98

APPLICATION NUMBER

10252245

APPLICANT: RICOH CO LTD;

INVENTOR:

MIFUNE HIROYASU;

Lb!

INT.CL.

G11B 7/135

TITLE

PRODUCTION OF OPTICAL ELEMENT

FOR OPTICAL PICKUP

la lla

Пþ

I la

ĮŽ

(c)

ABSTRACT :

PROBLEM TO BE SOLVED: To obtain a method for producing an optical element for an optical pickup of an integral type which is easy to produce while having high optical characteristics.

SOLUTION: At least one of recessed parts 11a, 11b which are approximately the same in the respective shapes of an objective lens 9 and solid immersion lens 10 formed on a substrate 1 by a recessed part forming process is packed with a high-refractive index transparent material having the refractive index higher than the refractive index of the substrate 11 by a transparent material packing process and is then closed by a recessed part closing member 12 or 13 having the refractive index approximately the same as the refractive index of the high-refractive index transparent material by a recessed part closing process. As a result, the sure packing of the high-refractive index transparent material into the recessed parts 11a, 11b is made possible and therefore, the production of the optical element 6 for the optical pickup is made easy and there is no need for limiting the high-refractive index transparent material to be packed into the recessed parts 11a, 11b to a solid and, therefore, the selection width of the high-refractive index transparent material is widened and the optical element 6 for the optical pickup having the higher optical characteristics may be obtd.

COPYRIGHT: (C)2000,JPO